Dam Inspection Checklist

Inspection of a large dam pursuant to ss. 31.19 (2) and ss.31.19 (4), Wis. Stats, should be conducted using the *Dam Inspection Checklist (Checklist)*. Use of the *Checklist* will provide consistency for inspections and a more efficient and accessible review process. The *Checklist* was designed to take into consideration the wide variety of dams in use in Wisconsin and covers all aspects of a dam inspection for which DNR needs documentation.

DNR Dam Safety is working to continually improve the forms and other information available to the Dam community. Please email any recommendations for changes or additions to the *Dam Inspection Checklist* form to dnrdamsafety@wisconsin.gov.

Instructions

- 1. Review the Dam Inspection Checklist form before beginning the inspection process. The Checklist was designed to be used with a wide variety of dams. By reviewing the Checklist before beginning the inspection process, an inspector can determine what pages from the form are needed, what information will be required and how to structure the inspection.
- 2. **Print only those pages that apply to the dam being inspected.** The *Dam Inspection Checklist* was designed to be used with a wide variety of dams. Therefore, not all sections of the *Checklist* may apply to the dam being inspected. The appropriate page numbers will need to be added to the document.
- 3. Fill out box at top of first page regarding the name of dam, name of inspectors, etc. Completion of this section is required in order to tracking of the data collected during the inspection.
- 4. Check the appropriate boxes to note what was reviewed on site, if photos are attached and what actions are required. A legend for the boxes can be found at the bottom of each page. Photos must be submitted with the completed *Checklist*. Details for preparing photographs can be found on Page 2 of this instruction sheet.
- 5. **Questions?** Please email any questions regarding the *Dam Inspection Checklist* form or process to dnrdamsafety@wisconsin.gov.

Personally identifiable information on this form will be used to administer the inspection program under ss.31.19 (2) and (4) and will not be used for other purposes. Inspection forms may be shared with the public, consistent with Wisconsin's Open Records law [ss. 19.31-19.39, Wis. Stats.].

Dam Inspections Photograph Instructions

- 1. On the Dam Inspection Checklist, check the appropriate boxes to note if photos were attached.
- 2. Printed and digital copies of the photographs must be submitted with the final Dam Inspection Report. Please limit the photographs to the following critical shots:
 - a. General views of the dam upstream and downstream sides of the structure (These should be photos of the dam itself, not the upstream and downstream channel)
 - b. All deficiencies of the structure
- 3. Digital images must be submitted on a CD or DVD. The disc must be labeled with the official name, key sequence number, and date [mm/dd/yyyy].
- 4. Digital images must be in .jpg format and should have a resolution (pixel dimensions) of 640 x 480. Label the files with the following naming convention:

Characters 1-5: Dam Key Sequence Number Characters 6-7: Month the photo was taken Characters 8-9: Day the photo was taken Year the photo was taken

Characters 12-13: Sequence number of photos taken that day

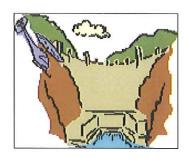
Characters 14-17: File extension ".JPG"

For example, the first photo of a dam with a Key Sequence Number of 250, taken on June 10, 2010 would have a file name of 0025006101001.JPG

5. Provide a list of the submitted photographs that includes the file name and a brief description of the photo. Please submit a printed copy and include the list on the disc. For example:

Inspection of Photogenic Dam (Key Seq # 250) June 10, 2010									
File Name	Description								
0025006101001.JPG	Upstream view of dam								
0025006101002.JPG	Downstream view of dam								
0025006101003.JPG	Trees on upstream slope of right embankment								

6. Label the printed photographs with the file name and a brief description. For example:



Photogenic Dam Downstream view 0025006101002.JPG

Certification for Dam Inspection

Local Dam Name (PRINT):
DNR Field File #:
I certify that I have completed the checklist truthfully and factually:
Certifier's Name (print):
Company Name:
Signature:
Date:
Multidisciplinary: I am experienced in the technical disciplines or I am working with other professionals experienced in the technical disciplines to properly inspect this dam and appurtenant works. Technical disciplines, in addition to general civil engineering, may include geotechnical, geological, hydrologic, structural, and mechanical:
Yes No
Engineer's Wisconsin Registration Number:
Expiration Date:
Engineer's Seal (optional):

Name of Dam:			Date:				
Inspectors:			F.F#:				
Owner's Name:			Key Seq #:				
Street:							
City, State, Zip Code:							i
County:			Phone:				
Weather and Site conditions:			Email:				
			GENERAL				
Item	N	P	Notes/ Observations	M	I	T	R
1 Monuments/Benchmarks						†	
Location:							
Elevation:							
Datum:							
2 D 17					_	_	
2 Pool Level Normal/Operating:						\perp	
Maximum:							
Minimum:							
Staff Gage	Н						
3 Access Road		-				Т	
4 Signage/ Security						Т	
Portage/route:							
Dam Warning:							
Downstream Hazard:							
Fencing/Railings/Catwalks:							
Additional Comments:							
raditional comments.							
							- 1
2							
N= Noted; P= Photo; M= Monitor			Action Suggestion 1. Requires immediate action				
I= Investigate; R= Repair			2. Plan to do soon				
F.F.= Field File; RT = Right; LT = I	Left		3. Do when convenient				
U/S = Upstream; D/S = Downstream							
			Dam Inspection Checklist			-	
Dam Name:		S:		Page	_ 0	f	

			GENERAL (Cont.)			
5 Hazard Section						
A. D/S Development						
Density:	:					
Distance:	~					
Type (Residential, Commercial,	,					
Industrial):	:					
B. Channel Crossing						
		dge, F	ord, Culvert, Trestle, Other (Explain) (Circle One)			
Dimensions:						
D/S distance:	1					
Traffic Level (Local, CTH,	~					
Rail Road, STH, Interstate, etc):	<u>:</u>					
C. Distance to nearest D/S	\square					
community/impoundment:						
Name:						
D. A. district al Heaville	-					
D. Anticipated Hazard (based	\vdash					
on landuse and zoning): E. Dam Failure Analysis	-					
Date Completed/Approved	H					
Is map available?						
Are map & profile adopted?						
List adoption date:						
Verify validity of failure mode:						
verify variately of failure mode.	\vdash					
Verify validity of DFA						
conclusions:						
F. Emergency Action Plan	Y	N	Comments, Explanation, and Description	M	I	R
1. Current plan posted?			Comments, Expandition, and Description	171		I
2. Understood by Operator?						-
3. Warning systems?						
4. Certification of last test?						
5. Remote operation?						
6. Revision Date?			g.			
7. Habitable structures?						
8. Recreation areas?			· ·			
9. Changed hazard potential?						
10. New development?						
11. Other comments?						
Additional Comments:						
N= Noted; P= Photo; M= Monitor			ation Engagotion 1 Dequires in a distance			
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U/S = Upstream; D/S = Downstream			3. Do when convenient			
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Dam Name:		E	Dam Inspection Checklist .F. #: Date:	Page	o f	

			EMB	ANKMENTS		
Description:						Action
	_					M I R
Item	N	P	Loc	ation on Embank	ment and Deficiency	
1 Vegetation:		No problem				
A. Trees						
Quantity (<5,sparse,dense): Diameter:						
Location:						
Docution.						
B. Brush						
Quantity (sparse,dense):						
Location:						
C. Ground cover						
Type (grass, crown vetch,other):						20-
Quantity (bare, sparse, adequate,						
dense):						
Appearance (too tall, too short,						
good): 2 Erosion	_	No problem	Т	Not applicable	C11 1	
A. Wave erosion (Beaching):	_	No problem		Not applicable	Could not inspect	1 1 1
Scarp: Length/ Width:						
Location:						
B. Runoff Erosion (Gullies)						
Quantity:			54			<u> </u>
Length/ Width/ Depth:						
Location:						
3 Instabilities		No problem		Not applicable	Could not inspect	
A. Slides Transverse:	_					
Longitudinal:						
Scarp: Length/ Width:						
Crack Length/ Width:						
B. Cracks:						
Transverse:						
Longitudinal:						
Length/ Width/ Depth:						
Location:						
Other:						
C. Bulges/ Depressions						
Size:						
Height/ Depth:						
D. Slope (Too Steep)						
U/S, D/S						
N= Noted; P= Photo; M= Monitor		Action Sug	gestio			
I= Investigate; R= Repair	r ^			2. Plan to do so		
F.F.= Field File; RT = Right; LT = 1				3. Do when con	venient	
U/S = Upstream; D/S = Downstream Additional Comments:						
Additional Comments:						
					*	
		Dam I	nspec	tion Checklist		
Dam Name:		F.F. #:	1		Date:	P of
	_		W- 100 hours			

		EMBA	NKMENTS (Cont.)				
	_				.A	ctio	n
Item	N	P	Notes/ Obs		M	I	R
4 Slope Protection		No problem	Not applicable	Could not inspect			
A. Type (none, riprap, wave	_						
berm, concrete slabs, loose formed							
concrete/asphalt): B. Condition:	\vdash						_
B. Condition.							_
5 Other		No problem	Not applicable	Could not inspect		-	-
A. Rodent burrows (few, many)							
Location:							
B. Ruts				1)			
Length/ Width/ Depth:							
Location:	_						
C. Other	_						
6 Alignment	-	NT11	N-4 11 1-1-1				
6 Alignment A. Vertical	-	No problem	Not applicable	Could not inspect			
Low area:	_						_
Elevation Difference:							
Location:	1						
	1						
B. Horizontal	T						
C. Width							
Too narrow:	1						
Location:	_		T by	T I			
7 Toe Cracks/Slumps:	_	No problem	Not applicable	Could not inspect			
Embankment drains:							_
Type/Flow:							
Location:							
Seepage/ Wetness:	1						
Hummocky:							
8 Seepage		No problem	Not applicable	Could not inspect			
Wet area:	_						
Boil:	-				-		
Sinkhole:	_				30		
Aquatic vegetation:	_						
Rust colored deposits:		\vdash					
Other: Sediment in Flow:	_						
Sediment in Flow: Flowrate:	_	I					
Location:							
N= Noted; P= Photo; M= Monitor		Action Sugges	tion 1. Requires imme	ediate action			_
I= Investigate; R= Repair		raction bugges	2. Plan to do soo				
F.F.= Field File; RT = Right; LT =	Left	ii e	3. Do when conv				
U/S = Upstream; D/S = Downstream							
Additional Comments:							
		Dam Insp	ection Checklist				
Dam Name:		F.F. #:		Date:	Page	of	

SPILLWAYPRINCIPAL - FIXED CREST A											
Item	N	P			Notes/ Observatio	ns	M	I	R		
1 Fixed Crest		No	problem		Not applicable	Could not inspect					
A. Dimensions	-										
Top Width											
B. Materials	+								-		
Di Hatteriais	\vdash	Ш	d						_		
C. Shape (sharp-crested,									П		
broad-crested, ogee, chute, gated,											
overflow, morning glory,											
dropbox, labyrinth)	+										
D. Debris Prevention (racks, booms, etc.)		Ш							_		
Frevention (racks, booms, etc.,	'										
E. Concrete Condition *	+	П							\vdash		
F. Flashboards (none, number):											
Type (Metal, wood)											
Dimensions Operability:											
Operatinty.											
G. Abutments		П							П		
Condition: 3	k								_		
Seepage/wetness	:										
II D	-		• •		Dr						
H. Drains	f	No	problem		Not applicable	Could not inspect					
Type: Weep holes, Relie drains, Other:	-								Щ		
Flow Rate:											
I. Other					Ť						
N= Noted; P= Photo; M= Monitor					equires immediate act	ion					
I= Investigate; R= Repair F.F.= Field File; RT = Right; LT =	1.4	Ŀ			lan to do soon						
U/S = Upstream; $D/S = Downstream$			Controlled = Gated	3. D	o when convenient Uncontrolled = Ov	verflow					
Additional Comments:	11		Controlled - Galed		Cheditioned – O	vernow			-		
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						3)					
* Type of Concrete Problems:	Spa	lling	, cracks, exposed rebar	, mi	salignment, joints, bus	g holes, efflorescence, popol	ıts.		_		
			ombing, scaling, craze/								
			Dam Inspect	ion	Checklist						
Dam Name:			F.F.#:		(2)	Date:		of	-		

A. Types (lift/slide, tainter(radial), stoplogs, leaf, roller, flashboards, needles, other) Number and Size: B. Stoplogs Dimensions: Condition: C. Abutments Condition: Seepage/wetness: D. Piers (number, shape) Condition: E. Operability Type of Operator: Condition(chain, cables, hoists): Security(locked?): Backup Operator: F. Access G. Condition Rust: Seals (leakage): H. Ice protection Type (Heaters, Bubblers, Barriers, Other) I. Debris Prevention (Rack, boom, etc.) J. Condition of Flowway K. Drains Type (Weep holes/ Relief drains/Other): Flow rate: Location: L. Other Action Suggestion 1. Requires immediate action		SPILLWAY-PRINCIPAL - GATES										
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K. Drains Type (Weep holes/ Relief drains/ Other): Flow rate: Location: L. Other N= Noted; P= Photo; M= Monitor Investigate; R= Repair S.F.= Field File; RT = Right; LT = Left SS = Upstream; D/S = Downstream Controlled = Gated Controlled = Gated Controlled = Overflow Additional Comments and/or Sketch: * Type of Concrete Problems: Spalling, cracks, exposed rebar, misalignment, joints, bug holes, efflorescence, popouts, honeycombing, scaling, craze/map cracks, isolated crack, disintegration, other Dam Inspection Checklist	J. Condition of Flowway	\vdash						\neg	Г	Г		
Type (Weep holes/ Relief drains/Other): Flow rate: Location: L. Other Investigate; P= Photo; M= Monitor										1		
Type (Weep holes/ Relief drains/Other): Flow rate: Location: L. Other Investigate; P= Photo; M= Monitor					=							
* Type of Concrete Problems: Spalling, cracks, exposed rebar, misalignment, joints, bug holes, efflorescence, popouts, honeycombing, scaling, crazeks, isolated crack, disintegration, other Other	MARKATAN SAN PERSANTENAN											
Flow rate: Location: L. Other Action Suggestion I. Requires immediate action 2. Plan to do soon 3. Do when convenient USS = Upstream; D/S = Downstream Controlled = Gated Uncontrolled = Overflow * Type of Concrete Problems: Spalling, cracks, exposed rebar, misalignment, joints, bug holes, efflorescence, popouts, honeycombing, scaling, craze/map cracks, isolated crack, disintegration, other Dam Inspection Checklist												
L. Other Action Suggestion I. Requires immediate action 2. Plan to do soon 3. Do when convenient Lowerflow Additional Comments and/or Sketch: * Type of Concrete Problems: Spalling, cracks, exposed rebar, misalignment, joints, bug holes, efflorescence, popouts, honeycombing, scaling, crazks, isolated crack, disintegration, other Dam Inspection Checklist	The state of the s											
L. Other I	59000-0000 100000000											
* Type of Concrete Problems: Spalling, cracks, exposed rebar, misalignment, joints, bug holes, efflorescence, popouts, honeycombing, scaling, craze/map cracks, isolated crack, disintegration, other Dam Inspection Checklist										Τ		
* Type of Concrete Problems: Spalling, cracks, exposed rebar, misalignment, joints, bug holes, efflorescence, popouts, honeycombing, scaling, craze/map cracks, isolated crack, disintegration, other Dam Inspection Checklist										1		
* Type of Concrete Problems: Spalling, cracks, exposed rebar, misalignment, joints, bug holes, efflorescence, popouts, honeycombing, scaling, craze/map cracks, isolated crack, disintegration, other * Dam Inspection Checklist	N= Noted; P= Photo; M= Monitor			Action Suggestion 1	. Requires imme	diate ac	etion					
* Type of Concrete Problems: Spalling, cracks, exposed rebar, misalignment, joints, bug holes, efflorescence, popouts, honeycombing, scaling, cracks, isolated crack, disintegration, other Dam Inspection Checklist	= Investigate; R= Repair			2	. Plan to do sooi	1						
* Type of Concrete Problems: Spalling, cracks, exposed rebar, misalignment, joints, bug holes, efflorescence, popouts, honeycombing, scaling, craze/map cracks, isolated crack, disintegration, other Dam Inspection Checklist			t									
* Type of Concrete Problems: Spalling, cracks, exposed rebar, misalignment, joints, bug holes, efflorescence, popouts, honeycombing, scaling, craze/map cracks, isolated crack, disintegration, other Dam Inspection Checklist				Controlled = Gated	Uncontro	lled = C	Overflow					
honeycombing, scaling, craze/map cracks, isolated crack, disintegration, other Dam Inspection Checklist	Auditional Comments and/or Sket	en:										
honeycombing, scaling, craze/map cracks, isolated crack, disintegration, other Dam Inspection Checklist												
honeycombing, scaling, craze/map cracks, isolated crack, disintegration, other Dam Inspection Checklist												
honeycombing, scaling, craze/map cracks, isolated crack, disintegration, other Dam Inspection Checklist												
honeycombing, scaling, craze/map cracks, isolated crack, disintegration, other Dam Inspection Checklist												
honeycombing, scaling, craze/map cracks, isolated crack, disintegration, other Dam Inspection Checklist												
honeycombing, scaling, craze/map cracks, isolated crack, disintegration, other Dam Inspection Checklist	+m - 10 - 11	-										
Dam Inspection Checklist	* Type of Concrete Problems: S							outs,				
enus (mare) 1771 - 1771	Dam Name:				on Checklist		Date: Do.	σe	of			

SPILLWAYPRINCIPAL - WHISTLE TUBES								
Item	N	P		Notes/ Observation	ons	M	I	R
1 Whistle Tubes		Ful	l circle/Whistle tube	Half circle riser	Glory hole (Drop Inlet)			
A. Inlet Riser Diameter								
P. O. d. d. d. d.	-	_						_
B. Outlet pipe * Dia: Type:	_							_
Dia: Type:								
C. Low level draw /Inlet Pipe	-	Г						-
What kind & Size:								Ш
D. Debris/Trash Rack						\Box		
E. Antivortex								
					=			
F. Material								
	_	_						
G. Alignment								
N= Noted; P= Photo; M= Monitor				. Requires immediate ac	tion			
I= Investigate; R= Repair F.F.= Field File; RT = Right; LT =	1 .6			. Plan to do soon				
U/S = Upstream; D/S = Downstream			Controlled = Gated	Do when convenientUncontrolled = O	nuauffa			
Additional Comments and/or Sket			Controlled – Gated	Oncontrolled – O	vernow			
Traditional Comments und/or Site								
* Type of Concrete Problems:	Spa	lling	, cracks, exposed rebar.	misalignment, joints, bu	ig holes, efflorescence, nono	uts.		
***	ho	ney	combing, scaling, craze	map cracks, isolated cra	ck, disintegration, other	,		
		·	Dam Inspecti		, , , , , , , , , , , , , , , , , , , ,			
Dam Name:			F.F.#:		Date: Page		of	

SPILLWAYPRINCIPAL - OUTLET EROSION CONTROL & UNDERMINING											
				A	etio	n					
Item	N	P	Notes/ Observations	M	I	R					
1 Outlet Erosion Control		Noj	oroblem Not applicable Could not inspect								
A. Type (none, endwall, plunge											
pool, energy dissipation structure											
rock lined channel, apron)											
B. Scour	\vdash	Т			_	_					
D. Scoul			*								
C. Material	\vdash	Т		П							
a. Riprap: Avg Diameter:	_										
Condition (adequate, sparse,											
displaced, weathered):											
Bedding fabric- (Yes/ No): b. Concrete *											
Dimensions/Location:											
D. Sidewall/Headwall	\vdash	Т		Т							
Misalignment:	H										
Location:											
Description:											
E. Separated Joint / Loss of											
Joint Material:											
Location: Description:											
Description.											
F. Natural	\vdash			П							
	<u></u>										
2 Undermining		Nor	oroblem Not applicable Could not inspect								
Location:	-										
Description:											
N= Noted; P= Photo; M= Monitor	_		Action Suggestion 1. Requires immediate action								
I= Investigate; R= Repair			2. Plan to do soon								
F.F. = Field File; RT = Right; LT =			3. Do when convenient								
U/S = Upstream; D/S = Downstream	1	(Controlled = Gated Uncontrolled = Overflow								
Additional Comments:											
22											
* Type of Concrete Dyahlama	Snall	ling	cracks, exposed rebar, misalignment, joints, bug holes, efflorescence, popol	utc							
Type of Concrete Fromenis:	hoi	neyco	ombing, scaling, craze/map cracks, isolated crack, disintegration, other	.118,							
		7	Dam Inspection Checklist								
Dam Name:]	F.F.#: Date: Page	:	of						

				SPII	LWAYAUXII	LIARY			
Des		A	ctio	n					
	Item	N	P		Notes/ Obser	rvations	M	I	R
1	Dimensions				30001 00020000000 5250 500 (000) 2				
	Length/ Width:								
	Outfall Slope:								
2	Type (turf, reinforced turf,								
	riprap, block, concrete):								
3	Signs of usage								
	(debris, bent grass, etc.):								
4	Vegetation:			No problem					
	A. Trees								
	Quantity (<5, sparse, dense):								
	Diameter:								
	Location:		_						
	B. Brush								
	Quantity (sparse, dense):								
	Diameter:								
	Location: C. Ground cover:	_	_						
		_							L
	Type (grass, crown vetch, other) Quantity (bare, sparse, adequate								
	dense):								
	Appearance (tall, short, good):								
5	Slope protection		Т	Not applicable					
٥	A. Type (none, riprap, wave		\vdash	Not applicable			Т		П
	berm, concrete slabs, other):								
	Condition:								
6	Erosion		Г	No problem	Not applicable	Could not inspect			
	A. Wave erosion (beaching):		\vdash		I		T		
	Scarp: Length/ Width:		_						
	Location:								
	B. Runoff erosion (Gullies)								
	Quantity:								
	Length/ Width/ Depth:								
	Location:								
7	Instabilities		\perp	No problem	Not applicable	Could not inspect		_	
	A. Slides	<u></u>							
	Transverse Length:								
	Longitudinal Length:								
	Scarp: Length/ Width:								
	Location: Crack Length/ Width:								
	Crack Length/ Width:								
NI-	Noted; P= Photo; M= Monitor			Action Suggestion	1. Requires immed	diate action			
100000000000000000000000000000000000000	Investigate; R= Repair			Action Suggestion	2. Plan to do soon				
	F.= Field File; RT = Right; LT =	Let	fi		3. Do when conve				
	S = Upstream; $D/S = Downstream$				2. Do mien conve				
	ditional Comments:								
*	Type of Concrete Problems:					joints bug holes, efflorescence, po	pouts,		
			hon	The same of the sa		olated crack, disintegration, other			
				•	ction Checklist				
Da	m Name:	F.	F.#:		1	Date: Page	2:	of	

			SPILLV	VAYAUXII	LIARY	(Cont.)		I	Actio	n
Item	N	P		Notes/				M	I	R
B. Bulges: (Depressions,										
Hummocky):										
Size										
Height/ Depth:		T				Too. or it				
8 Other		No	problem	Not applie	cable	Could not inspect				,
A. Rodent burrows (few, many)	_									
B. Ruts	-									
Location:	-							_	L	
Length/ Width/ Depth:										
C. Other (debris):									Т	-
C. Other (debits).	\vdash		l							
9 Outlet erosion control		No	problem	Not applie	cable	Could not inspect th	noroughly			
A. Type (none, endwall, plunge										
pool, energy, dissipation structure										
rock-lined channel, apron):										
Condition (Scour?):										
B. Material										
Riprap: Avg. diameter:										
Condition (adequate, sparse,										
displaced, weathered):										
Bedding fabric (Yes/No): C. Concrete *	\vdash	NIO	t auuliaahla							
a. Condition *	-	INO	t applicable						Т	-
b. Cracking *	\vdash								-	
Dimensions/Location:	⊢	<u> </u>								
c. Sidewall/ Headwall*	\vdash								Т	\vdash
Misalignment:			~						I	
Location:										
Description:										'
d. Joints									Ī	П
Separated:										
Loss of material:										
Location:										
Description										
D. Natural										
10 Undermining	\vdash	Nic	problem	Couldness	inopost	thoroughly			_	
Location	-	140	problem	Could not	mspect	thoroughly				
Description	_		Į							
N= Noted; P= Photo; M= Monitor	-		Action Suggestion	1. Requires	immedia	ate action				
I= Investigate; R= Repair			JB	2. Plan to de						
F.F.= Field File; RT = Right; LT =	Lef	ì		3. Do when	conveni	ent				
U/S = Upstream; D/S = Downstream	n									
Additional Comments:									8	
* Tyme of Consust: Built	0-	o11!	o ovodin 1	uohau!1!		into huma la da a con				
* Type of Concrete Problems:						ints bug holes, effloresc ted crack, disintegration		outs,	r.	
	1	IOHE	AND CONTRACT	ection Check		ica crack, disintegration	n, omer			
Dam Name:	F.I	F.#:	Dam Insp	ection Check	dist Da	te:	Page:		of	

LAKE DRAINS									
(Low level outlet, not a principle or aux. spillway)									
Item	Item N P			Notes/ Observations		Action M I R			
1 General	11		ne found	Does not have one		IVI	1	K	
A. Type of lake drain		140	ne round	Does not have one		\vdash	-		
(isolated control/intake tower,			ļ.						
valve vault with outlet conduit	1								
valve in riser/drop inlet siphon):									
Size:									
B. Operated (Yes/ No)									
2 Lake drain components									
A.Concrete structure									
Location:									
Description:*									
Condition:*	L								
B. Valve control (operating									
device): No operating device; No stem									
Bent/Broken Stem; Access									
Other:									
Operability:									
C. Valve/Sluice gate						П	T		
Quantity:									
a. Metal deterioration (surface									
rust, minor, moderate, extensive,									
other):									
Location:									
Flow rate:									
b. Misalignment									
c. Leakage - Flow rate D. Outlet conduit	\vdash								
Size:	H								
Material:									
Condition:									
E. Energy dissipater						П			
Type (endwall, plunge pool	Г								
impact basin, stilling basin,									
rock-lined channel, none):									
Condition:*									
N= Noted; P= Photo; M= Monitor			Action Suggestion	1. Requires immediate action					
I= Investigate; R= Repair				2. Plan to do soon					
F.F.= Field File; RT = Right; LT =		i.		3. Do when convenient					
U/S = Upstream; D/S = Downstrea									
Additional Comments:									
	_								
* Type of Concrete Problems:						outs,			
]	ione		raze/map cracks, isolated crack,	disintegration, other				
Dam Name:	F.F	7.#:	Dam Inspe	ection Checklist Date:	Page:		of		

Powerhouse/ Mill Building							
•					ctio	-	
Item	N	P	Notes/ Observations	M	I	R	
1 Est. Capacity (Kw): Date last used:		Ш					
Current Use:							
2 Item:							
A. Headrace general						\neg	
Gates/ Trashracks:							
Vegetation/ Erosion:							
Sloughs/Slides/Cracks:							
Seepage Wetness: Rodent Burrows:							
Concrete:							
B. Tailrace				П			
Scour:						-	
Vegetation/Erosion:							
Sloughs/Slides/Cracks:							
Seepage wetness:							
Rodent burrows:							
Concrete: C. Foundation: general							
Concrete:		ш				-	
Seepage:							
Integrity:							
D. Superstructure							
Condition:							
N= Noted; P= Photo; M= Monitor			Action Suggestion 1. Requires immediate action				
I= Investigate; R= Repair			2. Plan to do soon				
F.F.= Field File; RT = Right; LT =			3. Do when convenient				
U/S = Upstream; D/S = Downstream	n						
Additional Comments:							
	755 F	100	Dam Inspection Checklist				
Dam Name:	F.F	`.#:	Date: Page:		of		

FIELD BOOK									
Profile Leve	eling For:			Instrum	ent Person	:			
Original No	tes in Field	Book #		J	Rod Person	:			
Instrument Used: Note Taker:									
Weather Co	onditions:								
STATION	B.S. +	Н.І.	F.S	ELEV.	DIST.	REMAR	KS		
					***····				
							· · · · · · · · · · · · · · · · · · ·		

Bench Mar	(Informati	on (Location	Flevation	Datum):					
Denes Irani	× * * * * * * * * * * * * * * * * * * *	on (Eccurior	i, Dictation	, Datum).					
Comments:									
Suggested S	urvev noin	fs:							
Supported D		HW		Sill	CIO	Low Embankment			
		TW		Crest		Lt. Groin	Antonomeron		
		D/S Channe	el (at toe)	Abutments	D.M.	Rt. Groin	A		
		Aux. Crest		Aux. Crest		Outlet Pipe Invert			
Dam Name:	<u>'</u>		E.F.#:	am Inspect	ion Check Date		Page of		

STATION	B.S. +	H.I.	F.S	ELEV.	DIST.	REMARKS
		:				
Note:						

Survey data is a valuable dataset to document the constant or changing condition of your dam. It is often the best method to document changes, deficiencies and past construction or survey errors. In most instances, the decision to conduct a field survey will be based on the professional opinion of the consultant engineer and the responsibility of the dam owner. Based on the inspection report results, the Department may determine that a survey is required.

Examples of scenarios where survey is recommended by the Department:

- 1. To establish a baseline if the dam has no previous survey, an insufficient survey, or no current as-built plans on file
- 2. If evidence of an instability is documented during the inspection. Instabilities could include embankment settling, cracking, or slumping, cracking concrete, or noticeable miss-alignment.
- 3. For dams where the last survey on record is greater than 10 years old.
- 4. When new benchmarks or a new staff gage are installed.

Survey Standards:

- The Dam Datum must be the same as the Flood Insurance Study Datum for the County
- Survey may require both horizontal and vertical data collection and control
- Any Benchmarks or Staff Gages must be tied to the Dam Datum
- Survey Points noted on this page of the Dam Inspection Checklist are the minimum points suggested for a dam survey
- Use the appropriate level of accuracy consistent with Land Surveying standards to document the data being collected Suggested Survey points:

HW	Sill	Low Embankment
TW	Crest	Lt. Groin
D/S Channel (at toe)	Abutments	Rt. Groin
Aux. Crest LT	Aux. Crest RT	Outlet Pipe Invert

Dam Inspection Checklist

Dam Name:

F.F.#:

Date:

Dam Name:	F.F.#:	Dam Inspection Checklist Date:	 Page_	of_
		Dam Inspection Checklist		
		SKETCH	 	